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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/069,126	07/24/2002	Alain Goux	P22010	3526
7055 75	90 07/28/2006		EXAMINER	
GREENBLUM & BERNSTEIN, P.L.C. 1950 ROLAND CLARKE PLACE			SALVATORE, LYNDA	
RESTON, VA			ART UNIT PAPER NUMBER	
,			1771	
			DATE MAIL ED: 07/28/2006	ς.

Please find below and/or attached an Office communication concerning this application or proceeding.

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	Application No.	Applicant(s)	(
	10/069,126	GOUX ET AL.	
Office Action Summary	Examiner	Art Unit	
	Lynda M. Salvatore	1771	
The MAILING DATE of this communication Period for Reply	appears on the cover sheet with	the correspondence address	
A SHORTENED STATUTORY PERIOD FOR RE WHICHEVER IS LONGER, FROM THE MAILING - Extensions of time may be available under the provisions of 37 CFR after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory per - Failure to reply within the set or extended period for reply will, by state Any reply received by the Office later than three months after the magnetic patent term adjustment. See 37 CFR 1.704(b).	B DATE OF THIS COMMUNICA R 1.136(a). In no event, however, may a rep iod will apply and will expire SIX (6) MONTh atute, cause the application to become ABAI	ATION. ly be timely filed HS from the mailing date of this communication. NDONED (35 U.S.C. § 133).	
Status			
1) Responsive to communication(s) filed on 12	2 May 2006.		
-	his action is non-final.		
3) Since this application is in condition for allo	wance except for formal matter	s, prosecution as to the merits is	
closed in accordance with the practice unde	er <i>Ex parte Quayle</i> , 1935 C.D.	11, 453 O.G. 213.	
Disposition of Claims			
4)⊠ Claim(s) <u>15-28 and 30-38</u> is/are pending in	the application.		
4a) Of the above claim(s) 34-38 is/are withd	· •		
5)⊠ Claim(s) <u>31-33</u> is/are allowed.			
6)⊠ Claim(s) <u>15-28 and 30</u> is/are rejected.			
7) Claim(s) is/are objected to.			
8) Claim(s) are subject to restriction an	d/or election requirement.		
Application Papers			
9)☐ The specification is objected to by the Exam	iner.		
10) The drawing(s) filed on is/are: a) a	accepted or b) objected to by	the Examiner.	
Applicant may not request that any objection to	the drawing(s) be held in abeyance	e. See 37 CFR 1.85(a).	
Replacement drawing sheet(s) including the cor			
11) The oath or declaration is objected to by the	Examiner. Note the attached	Office Action or form PTO-152.	
Priority under 35 U.S.C. § 119			
12) Acknowledgment is made of a claim for fore a) All b) Some * c) None of: 1. Certified copies of the priority documents. Certified copies of the priority documents. Copies of the certified copies of the papplication from the International Bure. * See the attached detailed Office action for a	ents have been received. ents have been received in Appriority documents have been re eau (PCT Rule 17.2(a)).	olication No eceived in this National Stage	
Attachment(s)	4) 🔲 Interview Su	mmon/(PTO 442)	
 Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) 	Paper No(s)/	Mail Date	
 Information Disclosure Statement(s) (PTO-1449 or PTO/SB/ Paper No(s)/Mail Date 	(08) 5) Notice of Info	ormal Patent Application (PTO-152) .	

Application/Control Number: 10/069,126 Page 2

Art Unit: 1771

DETAILED ACTION

Response to Amendment

1. Applicant's amendment and accompanying remarks filed 5/12/06 have been fully considered and entered. Claim 15 has been amended and claim 29 has been canceled as requested. Applicant's amendment to claim 15 is found sufficient to overcome the obviousness rejection set forth in section 3 of the Office Action dated 12/12/05 over Riedel et al., US 5,631,073 in view of Young et al., US 4,833,179. Specifically, the combination of prior art fails to teach the newly added limitation of "wherein the adhesive has a viscosity of 80,000-150,000cP". As such, these rejections are hereby withdrawn. Applicant's cancellation of claim 29 renders moot the obviousness rejection set forth in section 4 of the Office Action dated 12/12/05 over Young et al., US 4,833,179 as applied to claim 15. However, Applicant's amendment made to claim 15 is not found sufficient to overcome the obviousness rejection made over Shaffer et al., US 5,916,393 in view of Riedel et al., US 5,631,073 and Applicant's arguments are not found persuasive of patentability for reasons set forth herein below.

Claim Rejections - 35 USC § 103

- 2. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
- 3. Claims 15-28 and 30 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Shaffer et al., US 5,916,393 in view of Riedel et al., US 5,631,073.

Applicant amended claim 15 to recite the limitation of "wherein the adhesive has a viscosity of 80,000-150,000cP", and argues that the prior art of Shaffer et al., fails to teach the

Art Unit: 1771

claimed adhesive viscosity, the claimed immersion depth of the adhesive, or the claimed nonwoven support features. These arguments are not found persuasive.

With regard to Applicant's arguments directed to the claimed adhesive viscosity, it is respectfully pointed out that Shaffer et al., clearly teach an adhesive having a viscosity of ranging from 5,000-80,000cP (column 3, 55-60). It is the position of the Examiner that since there is an overlapping value of 80,000cP, the claimed adhesive viscosity limitation is met.

With regard to the claimed immersion depth of the adhesive, it is respectfully pointed out that Shaffer et al., clearly teach an application method which results in an adhesive penetration distance ranging between .1mm to .13mm (column 1, 65-column 2, 5 and column 5, 31-33).

Since, the claimed value of .5mm falls within the penetration range of Shaffer et al., the claimed adhesive penetration limitation is considered met.

With regard to Applicant's arguments directed to the non-woven substrate, it is respectfully pointed out that Shaffer et al., clearly disclose a variety of suitable fibrous substrates made from inorganic, organic, minerals or thermoplastic materials such as polymers (column 2,40-45). Though Shaffer et al., exemplifies a non-woven support made from glass fibers, it would be improper to ignore the disclosure directed to the other fibrous substrate materials. To that end, the secondary reference of Riedel et al., was specifically relied upon to teach the claimed non-woven support features. It is the position of the Examiner that since the primary reference of Shaffer et al., fails to specifically teach the features of the fibrous non-woven substrate made from organic or thermoplastic materials, it is proper to look to the prior art to identify other suitable non-woven structures made from those materials for the intended use.

Application/Control Number: 10/069,126

Art Unit: 1771

To reiterate, the patent issued to Shaffer et al., teach a method of penetrating a porous substrate with pressure sensitive adhesive (Abstract, column 1, 54-60 and column 5, 8-32). Suitable porous substrates include non-woven products (column 7, 31-35). Shaffer et al., teach extruding the adhesive onto the substrate and then subjecting the adhesive to an impingement method such that the adhesive penetrates the substrate ranging in distance between .1mm to .13mm (column 1, 65-column 2, 5 and column 5, 31-33). Shaffer et al., teach that the disclosed impingement method improves the bond between the adhesive and the porous substrate (column 4, 45-56). Shaffer et al., teach a viscosity of ranging from 5,000-80,000cP (column 3, 55-60). Specifically, Shaffer et al., teach employing high viscosity adhesives to provide resistance to creep (gradual flow) in the final product at higher temperatures (column 3, 55-60).

Shaffer et al., fails to teach the claimed non-woven support features, however, the patent issued to Riedel et al., teach a non-woven sheet and pressure sensitive adhesive tapes formed therefrom (Abstract). With regard to the felt or needle-bonded limitation, Riedel et al., teach forming a non-woven by physical entanglement or needling (Column 6, 57-62). With regard to the adhesive layer limitation, Riedel teach coating a layer of pressure sensitive adhesive onto the non-woven sheet (Column 9, 22-25). With regard to the rolling and winding limitations, Riedel et al., teach that the non-woven sheet material may be conveyed directly to an adhesive coater, followed by slitting into individual tape rolls. With regard to the limitation of coating the opposite side of the non-woven support with an anti-varnish, Riedel et al., teach the use of a releasable liner that covers the adhesive layer or a release coating, such as a low adhesion backsize, coated on the non-adhesive side of the tape to facilitate the winding of the tape into rolls (Column 10, 46-53). With regard to the support thickness limitation, Riedel et al., teach a

Page 5

Art Unit: 1771

thickness ranging from .04mm to about .5mm in thickness (Column 6, 31-35). With regard to the surface mass limitations, Riedel et al., teach a weight ranging from 10 g/m² to about 100 g/m² (Column 6,35-41). With regard to the calendaring limitations, Riedel et al., teach pattern embossing or flat calendaring the non-woven sheet (Column 23, 5-25). With regard to the fiber material limitations, Riedel et al., teach a non-woven structure formed form a variety of materials such as polyester staple fibers (Column 5, 8-23). In addition, Riedel et al., also teach employing polyester, polyethylene, polypropylene or polybutylene binder fibers in amount ranging from 5-50% (Column 5,50-Column 6, 30). With regard to the ratio of polyester to viscose fibers, Riedel et al., teach in various examples illustrating the use of a fiber mixture consisting of 50% PET (polyethylene terephthalate), 30% rayon (viscose), and 20% diawa (binder fibers) (Column 15, table 3).

Therefore, motivated by the desire to improve the bond strength between the adhesive and the porous non-woven substrate, it would have been obvious to one having ordinary skill in the art at the time the invention was made to apply the high viscosity pressure sensitive adhesive using the method taught by Shaffer et al., to the non-woven substrate taught by Riedel et al. Specification motivation to employ the substrate of Riedel et al., is found in the desire to provide a pressure sensitive non-woven tape product.

With regard to the physical property limitations of tearing effort, tearing resistance, modulus at elongation, unrolling effort and elongation break, the combination of prior art fails to explicitly teach these features, however, it is the position of the Examiner that said limitations are inherent to the adhesive tape provided by Shaffer et al., in view of Riedel et al., Support for said presumption is found in the use of like materials (i.e., a non-woven substrate and pressure

Application/Control Number: 10/069,126

Art Unit: 1771

sensitive adhesive) and the use of like processes such as impinging a pressure sensitive adhesive into the non-woven substrate, which would result in the claimed tearing effort, tearing resistance, modulus at elongation, unrolling effort and elongation break properties. Applicant is invited to evidence otherwise.

Allowable Subject Matter

4. As previously set forth in section 5 of the Office Action dated 12/12/05, claims 31-33 were found allowable. Presently, the prior art does not teach further applying a polyethylene or polyester based powder to the adhesive face. An updated art search produced the closest prior art of Nelson et al., US 5,232,838 which teaches coating a substrate with a water based adhesive and a dusting layer of a cold water soluble powder (Abstract). Nelson et al., however, fails to teach a polyethylene or polyester based powder. Presently, no motivation exists to combine references to form an obviousness type rejection.

Conclusion

5. THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

Art Unit: 1771

however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lynda M. Salvatore whose telephone number is 571-272-1482. The examiner can normally be reached on M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on 571-272-1478. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

July 21, 2006

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